

CLAIMS:

1. A method of synthesizing of a speech signal, comprising:
 - assigning of a first identifier to a first class of intervals of an original speech signal and assigning of a second identifier to a second class of intervals of the original speech signal,
 - 5 - windowing the original speech signal to provide a number of pitch bells,
 - processing the pitch bells having the first identifier assigned thereto for modifying a duration of the speech signal,
 - performing an overlap and add operation on the processed pitch bells.
- 10 2. The method of claim 1, the first class of intervals being steady intervals.
3. The method of claim 1 or 2 a first code or a second code being used as the first identifier, the first code being indicative of an unvoiced interval and the second code being indicative of a voiced interval.
- 15 4. The method of claim 1, 2 or 3 the second class of intervals being dynamic intervals.
5. The method of any one of the preceding claims 1 to 4, whereby a third code, a
20 fourth code, a fifth code or a sixth code is used as the second identifier, the third code being indicative of an unvoiced interval being essential for the intelligibility of the speech signal, the fourth code being indicative of a voiced interval being essential for the intelligibility of the speech signal, and the fifth code being indicative of an unvoiced interval not being
25 essential for the intelligibility of the speech signal and the sixth code being indicative of a voiced interval not being essential for the intelligibility of the speech signal.
6. The method of claim 5 whereby pitch bells being assigned to the fifth or sixth code are deleted optionally.

7. The method of any one of the preceding claims 1 to 6 whereby a raised cosine is used for windowing of the speech signal.

8. The method of any one of the preceding claims 1 to 7, a sine window being
5 used for windowing of steady, unvoiced intervals of the speech signal.

9. The methods of any one of the preceding claims 1 to 7 further comprising randomizing the pitch bells of steady, unvoiced periods before performing the overlap and add operation.
10

10. The method of any one of the preceding claims 1 to 9, whereby the windowing is performed by means of a window positioned synchronously with a fundamental frequency of the speech signal.

15 11. Computer program product, such as a digital storage medium, the computer program product comprising program means for performing the following processing steps for the modification of a duration of an original speech signal:

- assigning of a first identifier to a first class of intervals of an original speech signal and assigning of a second identifier to a second class of intervals of the original speech
20 signal,
- windowing the original speech signal to provide a number of pitch bells,
- processing the pitch bells having the first identifier assigned thereto for modifying a duration of the speech signal,
- performing an overlap and add operation on the processed pitch bells.

25

12. Computer system, in particular text-to-speech system, comprising:

- means (302) for storing of a speech signal,
- means (304) for storing of first identifiers being assigned to a first class of intervals of an original speech signal and for storing of a second identifiers being assigned to
30 a second class of intervals of the original speech signal,
- means (306) for windowing the speech signal to provide a number of pitch bells,
- means (308) for processing the pitch bells having the first identifier assigned thereto for modifying a duration of the speech signal,

- means (310) for performing an overlap and add operation on the processed pitch bells.

13. A synthesized speech signal being composed of pitch bells, which are
5 overlapped and added, whereby only pitch bells of steady voiced or unvoiced intervals of an original speech signal have been processed in order to accomplish a duration modification of the original speech signal.

14. The speech signal of claim 13 whereby one or more pitch bells belonging to a
10 dynamic voice or unvoiced interval have been deleted prior to the overlap and add operation.